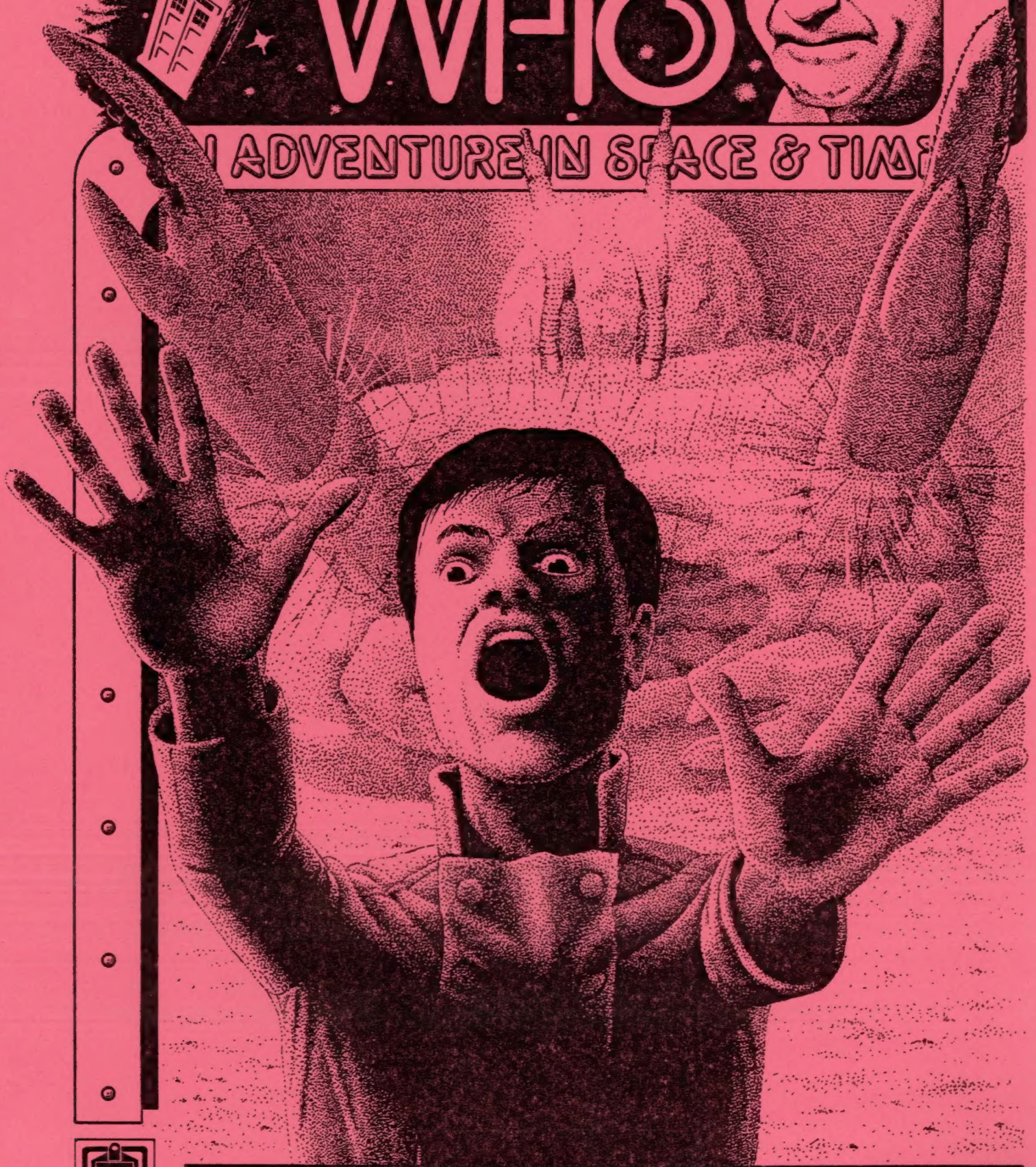
THE MACRA TERROR

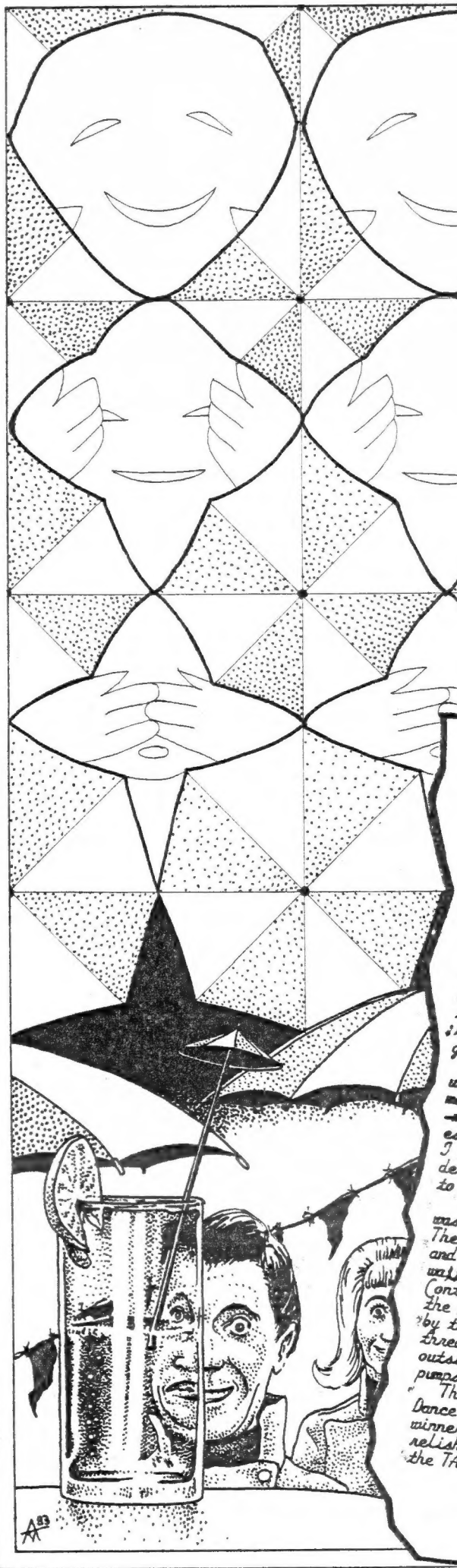
DOCTOR WHO

A ADVENTURE IN SPACE & TIME



CODE: JJ.

Ian Stuart Black



The image of the crab's claw was indeed a portent of things to come... We materialised in an idealistic colony, where everyone seemed happy working under the direction of a Pilot, who received his orders from a Central Controller. Everyone, that is, except for a chap called Medok, who claimed that the camp was invaded nightly by crab-like monsters - Macra. I wondered why one man should be close to insanity when everyone else seemed content with their lot. At night, during curfew, I ventured outside and met Medok, whereupon I, too, saw a Macra. The guards hunting us denied witnessing it, although it had passed by them. Evidently these colonists were being conditioned not to see them.

Along with Polly and Jamie, I managed to resist a brainwashing attempt during the night, but unfortunately Ben didn't. I furtively destroyed the conditioning equipment in the Pilot's office and asked why we never saw the real Controller, merely a television picture. Straight away the picture disappeared, revealing a petrified old man who was promptly pulled away by a giant claw - the Macra were the true rulers of the colony.

Jamie and Polly were made to work in the gas mines with Medok, under Ben's watchful eye, whilst I was sent to work with the pump machinery. Once there, I soon worked out the formula of the gas - much to the chagrin of the Pilot. Jamie and Medok managed to escape along an old shaft, but this was being used by the Macra. I deduced that the gas was crucial to the Macra's existance and delayed them by sending fresh air along the shaft, helping Jamie to escape, but too late to save Medok.

While escaping from the mine buildings, Polly and I saw what was behind the Control Voice - a gigantic, disgusting, white Macra. The Macra were like germs in the human body - acting as parasites and living off the work of the colonists. Because I had broken the wall conditioner, the Pilot at last perceived the real colony Controllers when I showed him the Macra. In response to this Ola, the Chief of Police, was given the Pilot's position of authority by the Macra and we were locked in an office with gas seeping in, threatening to subdue our will-power. However, a recovered Ben was outside the office and, under my guidance, he destroyed the gas pumps, thereby killing off the Macra.

The colony was free and, in gratitude, it was announced that a Dance Festival would be held every year in our honour - the winners receiving an award named "The Strangers' Trophy". I didn't relish being elected the new Pilot, however, so we hurried back to the TARDIS and safety.

$\partial^3 \Sigma x^2$

DRAMA EXTRACT

Polly woke with a jolt as a small, muffled explosion went off close by her bed. The first sight which met her clearing vision was the Doctor probing the remains of a burnt-out piece of circuitry with a button hook.

"Wake up, Polly."

"Doctor! What on Earth are you doing?"

The little man pulled on the button hook, fishing out a thin strand of wire which led from the formerly hidden wall-unit to the pillow on which Polly's head had been resting. He looked up. "I've been scotching a rumour - or should I say, scorching?"

Sitting up in bed Polly commanded her brain to function, conscious that she had been rudely awakened from a very sound sleep. "What happened?" she asked.

"I think you've been listening to some very bad advice."

"But I've been asleep," said Polly, stifling a yawn.

"Yes, I know you have. Fast asleep. Very fast asleep." The Doctor stood up and sniffed the air. "Polly, do you smell anything; a sort of sweet perfume?"

Polly inhaled deeply but shook her head. "No."

"Never mind. Now, Polly, I want you to forget everything you've been dreaming."

"Why do you say that?"

"It's just possible," began the Doctor, fingering the wire, "that you've been given a series of orders while you've been asleep. You know, 'do this', 'do that', 'do the other thing'. My advice to you is don't do anything of the sort. Don't just be obedient. Always make up your own mind..." Suddenly a new thought struck him. "What am I thinking of? Ben and Jamie...!"

Leaving Polly to put on her shoes the Doctor tore out of her cubicle and barged into the double chalet across the hall. Rushing over to Ben's bed he knelt down and began fishing again with his button hook into the small air vent above the sailor's head. The noise was enough to disturb Ben who stirred and looked lazily up at the frantically busy Doctor. "Hello, Doctor. Is it morning?"

"No. Not yet. Nearly so," he replied absently.

A shadow of suspicion passed over Ben's eyes as he noticed the Doctor's actions. "What are you up to?"

"Well, by my calculations there should be a thin strand of wire in the wall here - like a nerve tapping the subconscious of the human brain."

Ben frowned. "Look, lay off, mate! You'll find yourself on a charge."

Ignoring this the Doctor continued his work, squinting into the grille in a bid to locate the wire's terminal point. "It should be here somewhere."

"Pack it in, Doctor!" Ben's voice was angry now. "The way you mess about you could do some damage."

"Better some damage than loss of willpower."

"What are you on about?" The young sailor leapt to his feet and pushed the Doctor violently away from the wall. "Get out of it! It's against the law."

The impact of Ben's words abruptly struck home with the Doctor. He knew then he was too late. "What law?" he demanded.

"The law of the Colony," Ben replied woodenly. Suddenly the Doctor's arm shot out and tugged the button hook still protruding from the wall. There was a flash and an ephemeral spurt of flame. Ben's hands bunched into solid fists and for a second it looked as though he would hit his long-time friend. He controlled himself, though, but stuck out an accusing finger. "Now you'll get chucked in jail."

"What's the matter with you, Ben?" It was Polly at the doorway. "Since when did you start to worry?"

Ben pointed at the Doctor. "He thinks he knows best all the time, but this time he's wrong!"

STORY REVIEW

Tim Robins

Some time in the future, on a far-distant but Earth-like planet, there exists a Colony filled with hidden menace. A place where an unwary stranger can fall foul of a massage, sauna or, worse, a shampoo. For some, it is too much...

"Hey, mister! Will you call the ladies off?" a plaintive voice cries. "I'm frightened of what they might do to me!"

Attempts to placate Jamie fail. "But you look charming, sir, charming!"

"That's what I'm frightened of!"

It's tough to remain a man's man in a universe of balletic Fish People and affected French scientists, but Jamie manages to win another battle in his ceaseless war against those who think wearing a kilt is effeminate.

The Doctor and his companions have just met the welcoming committee which introduces them to Colony life - where the biggest excitement looks like wondering if Polly will be voted Beauty President by the end of the episode!

In fact, things aren't what they seem - thank God! After all, the story is called 'The Macra Terror'. Terror is provided by the frightened form of Madok. He has seen creatures - horrible, giant insects that crawl across the ground at night. However, a little treatment in the Hospital for Correction will soon cure that! Unfortunately for all concerned, the Doctor believes him and so the adventure begins.

All in all, 'The Macra Terror' is a bit of a shambles; which is a pity, because it doesn't seem as thrown together as 'The Moonbase'. The trouble lies in the fact that it is pretentious. It is difficult to decide whether it is social comment in search of a plot, or a plot in search of social comment. Despite this, the plot holds a great deal of promise. The Doctor discovers a Colony being brainwashed and set to work by parasitic insect-creatures who need the buried pockets of a poisonous gas to survive. In the course of his investigations Ben is hypnotised, Polly is attacked by the Macra and Jamie is nearly suffocated in a mine-shaft.

What doesn't work is the holiday camp backdrop, for that is how the Colony is run. "We regulate our day by music," the companions are informed; and, sure, enough, cheery jingles are interspersed throughout the proceedings, exhorting the Colonists to work hard and have fun. Muzak assaults the ear at every opportunity, and a friendly Controller pops up every now and then to reassure Colonists that everything is...well ...under control! The Colony hierarchy spout the usual platitudes: "If at first you don't succeed try, try, try again", "Work never hurt anyone", and "The Colony needs you!" whilst every activity is given some grandiose name, such as 'The Danger Gang' or 'The Refreshing Department'.

Of course, all this is supposed to jar. The idea is to provide a chilling contrast between the superficially relaxed, happy life of the Colony and the sinister schemes of the Macra. At the same time a rather crude message is being put across about brainwashing and the dangers of obeying commands without question; but as serious or satirical, political comment it just doesn't wash. The contrast is lost because so much of the story is focused upon the action, chaos and danger. The Controller rapidly loses his cool, making it obvious to everyone that things are out of hand, with very little attempt to keep up a cheerful façade. Not enough is seen of everyday Colony life to make the contrast work. In fact, most of the story's imagery is quite chilling.

The concept of a Colony is taken literally at times. There are allusions to it running like a colony of ants, with its network of command and the giant Macra at its centre. Sometimes the metaphor gets a bit mixed, and the Colony appears as a living organism, with its network of nerves sending information back to its Brain. This

metaphor is continued when the Macra are likened to parasites invading its body. Some of this seems to hark back to 'The Web Planet', with the parasitic Animus and its servants.

This is complemented by some bland, typically Troughton sets, three walls and a table. The Macra, whilst cumbersome, is effective...what little is seen of it (most of the scenes in which it/they appear take place at night). On the whole, a creature confined to breathing a particular gas fed to it via pipes doesn't lend itself to a great number of action scenes, and the plot idea doesn't sustain four episodes. Most of episode three is spent with the Doctor looking at various dials and pipes, as Jamie attempts to escape from a mine-shaft. It is, however, the characters (and in particular the companions) who prove to be the most pleasant surprise in the story.

After the shared dialogue of 'The Underwater Menace' and 'The Moonbase' Jamie, Ben and Polly now have equally useful roles. Ben is quite sinister as a brainwashed lackey of the Controller, whilst Jamie becomes the butt of unexpected humour, demonstrating the Highland Fling by flinging himself out of a door and into the arms of awaiting guards. Polly redeems herself. True, she does get excited at the prospect of having a shampoo, but she goes on to help the Doctor nobble the Macra's gas-supply.

The Doctor has recovered a bit from his subdued role in 'The Moonbase'. He cheerfully walks into the hands of his enemies: "Good morning, good morning, good morning! Well, everyone is up bright and early!" To Ola and the Pilot, who are blaming each other for the Doctor's escape: "Oh, come now, we can't have bad temper and differences of opinion in this happy-type Colony! Say you're sorry, Ola. Say you're sorry, Pilot."

The Control voice itself is one of the most chilling aspects of the serial. "This is an emergency!" it shrieks. "Control must be believed and obeyed. No-one in the Colony believes in Macra! There is no such thing as Macra! Macra do not exist! There are no Macra!" This speech sounds strange when delivered to the Doctor and his companions, none of whom has ever heard of the Macra! Nor has anyone else - who talk only of grotesque insects. Giving their name, which only the Macra themselves seem to know, and then denying their existence is, after all, pretty weird!

With the Macra destroyed life at the Colony returns to normal, or does it? Here the message of the story seems confused. Revelry and happiness have been shown to be rather superficial aims in life and yet the Colony, now freed from this enforced banality, celebrates with a dance! It is to be an annual event, and the winner will receive "the Strangers' Trophy". More appropriate, surely, would be an hour's silence, as it seems the Macra weren't responsible for everything.

Ian Stuart Black scathingly attacks those who simply want to obey commands; the 'Control knows best' mentality which engages people in meaningless work that does them no good. However, what are we to make of the Pilot's statement about Madok, that "He will co-operate and he will obey orders. He'll be just like the rest of us..." when we hear Jamie saying: "I take orders from no-one but the Doctor"?

Is it simply a choice of leader the companions face? "The Controller knows what's best for us," Ben argues. We might imagine, in different circumstances, him saying: "The Doctor knows what's best for us."

'Doctor Who' is a versatile programme. Doubtless the bizarre, the symbolic, the satirical can all be encompassed in its timeless theme. However, what 'The Macra Terror' does show is that if you want to attempt a subtle story, it's best not to include large, alien crabs roving around a holiday camp...

SPACE & TIME

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SPACE & TIME

Special Sounds 1

(Brian Hodgson)

Jeremy Bentham

When a "Dinky Toy" Police Box became a TARDIS and a pepper-pot the first Dalek, when the nurseries and playgrounds of Britain began echoing to staccato cries of "exterminate", a generation of children were unconsciously paying tribute to the talents of 'Doctor Who's' most unsung designer - Brian Hodgson.

A native of Liverpool, Hodgson was still in his early twenties when, as a junior member of the BBC's Radiophonic Workshop, he was called upon to create all the special sounds for the pilot episode of 'Doctor Who', "An Unearthly Child" (Serial "A"). Amid all the interior hums and whirrs associated with such a fantastic ship as the TARDIS, Hodgson came up with one of the sounds most associated with 'Doctor Who' - the dematerialisation noise. This sequence of special sounds took four weeks to complete from the initial treatment of the recorded sound of a Yale key being stroked along a piano wire. Using oscillators, "wobulators", a white noise generator and a portable effects unit (more adequately described by Hodgson as a crude system of sound filters) the now famous take-off sound of the TARDIS was created.

Describing himself as something of a sound purist, Hodgson's belief is that, where possible, the special sounds for a story should be created from one single sound, idea, or piece of equipment to give the story a kind of audio continuity. On his second 'Doctor Who' story, for example, he based all the sounds of the Dalek City around the notion of an electronic heartbeat - pulsing, rhythmical effects suggesting the city's role as the bringer of life and power for the encased creatures.

Adding special sounds to an episode of 'Doctor Who' was no mean feat during the show's early days since, with rare exception, all sound effects had to go onto the soundtrack during the actual recording of an episode. Post-production dubbing and editing were still directors' dreams in 1963. Consequently, Brian Hodgson had to create finished tapes of all his special sounds before a given episode's recording date, and then hand them, fait accompli, to the Grams Operator who would cue them onto the master videotape at the right moment. This process did have some benefits, however. Using the studio's public address system the sounds could be heard by the actors as well, enabling them to react to the sound of a ray-gun being fired, or a scanner being turned on and off. This proved vital to the animating of 'Doctor Who's' most famous monsters, the Daleks.

Each operator inside the early Daleks had a button to switch on and off the light valves indicating which machine was speaking. Thus, only by hearing the special voices over the loudspeaker system could the operators flash the lights in unison with the words being said.

Some dubbing was possible, though only on filmed sequences where separate magnetic soundtracks accompanied the frames on the film. Working to the golden rule that one frame of film equals 0.6" of sound tape at 15 i.p.s., background mood effects, voices and special sound effects could be dubbed on by the Film Editor.

While background sound effects occupied much of Brian Hodgson's time on 'Doctor Who' his main source of enjoyment in working on the show was the creation of sounds for the monsters. These would either be associated mood sounds, like the slithering of a Mire Beast or the trundling noise of a Chumbley, else a special voice requiring the manipulation of an actor's spoken lines.

The Macra were instances of the former. The storyline called for the Macra to be repellent, ponderous, crab-like parasites living, like leeches, on the lifeblood of the Colony. The Special Effects Department devised a creature that, while not very mobile, oozed a foaming slime from orifaces in its body. Taking this as a guideline, Hodgson treated the sound of bubbles being blown into a glass of detergent - slowing down the sound to give it a slow, deliberate sense of scale. This sound was further

enhanced by Hodgson slowing down the sound of his own voice making raspy, gurgling noises.

Alien voices were the other stock in trade, principal among them, of course, being the Dalek. Much credit is given to the Ring Modulator which sets up a low frequency hum and breaks up speech-patterns into juddery, intermittent tones; but Hodgson is always keen to emphasise the key role played by voice artists such as Peter Hawkins and Roy Skelton. In the radio play 'Sword From The Stars' the same technique of Ring Modulation was used to give the Jones Robot his haughty but mechanical voice. Only when Peter Hawkins and David Graham intoned their flat, harsh delivery of Terry Nation's dialogue did the elegant Jones Robot become the vengeful, irradiated mutants of Skaro!

In 1967 the combined abilities of Brian Hodgson and Peter Hawkins were used to create another very famous voice for 'Doctor Who' - that of the Cybermen. Displeased by his first efforts on 'The Tenth Planet' (Serial "DD") Hodgson devised something more chilling for 'The Moonbase' (Serial "HH"). He embedded a small loudspeaker into a dental-plate specially made to fit Peter Hawkins. Once fitted flush up against the roof of Hawkins' own mouth a pulse of sound through a wire connected to the speaker would set up a vibration in the actor's mouth such that, by merely forming words with his lips, Hawkins could speak those words with a tinny, electronic drone. The result was very impressive, but it had two drawbacks. Firstly, due to the expense of having the dental-plate made, only Peter Hawkins could wear the device; and secondly, prolonged periods of doing the Cyber-voice gave Hawkins acute nausea and headache owing to the side-effects of continual skull vibration.

Brian Hodgson's contribution to the success of 'Doctor Who' cannot be overstated. Every story from "A" to "PPP" bore his initials, although acknowledgement of his work in the end credits sequences did not come until the dawn of Patrick Troughton's second season. Ever a perfectionist he constantly sought means to generate new special sounds for the series using the commonest of objects. One of his own personal favourite moments was the fiery climax to 'The Evil of the Daleks' (Serial "LL"). Recalling the madcap few weeks spent compiling this ten-minute sequence Hodgson remembered the apparatus used to create the sound of Daleks being hit by their own ray-guns, exploding and exuding their smouldering, crackling innards.

"We actually heated up a metal plate until it was almost white-hot. And then we poured cold water on it to get that harsh, impact sound of a Dalek being zapped as the water splashed and then sizzled along the plate. Very dangerous, but it worked very well."

Although his work has been largely unsung, Brian Hodgson did gain some recognition of his talents when, in 1968, he was asked to appear on 'Blue Peter' to demonstrate the newest piece of equipment in the Radiophonic Workshop's arsenal. The device was a British-built VCS III monophonic synthesiser, one of the first such machines in the world. No more than 19" across and costing just £196 it increased the capabilities of the Workshop by almost a hundredfold, and greatly diminished the time needed to generate raw sounds for treatment. Not surprisingly it was very hurriedly pressed into service on 'Doctor Who' by Hodgson, with almost its first job being to create the electronic bleeps for a very special race of hairy monsters...

RADIO TIMES

Issue dated:
11th. to 17th.
March 1967

DR WHO and the Macra Terror

1 5.50 THE time machine has whirled the Doctor, Ben, Polly, and Jamie to a strange planet in the distant future when tonight's new adventure begins. As a place the planet seems to have a lot to recommend it. It is run like a huge highly organised holiday camp—with cheer-leaders, bands, and happy slogans exhorting the workers to enjoy themselves. Everything seems fine until the Doctor and his party meet Medok—a man who wants to escape from this paradise and who keeps babbling about a mysterious race of 'insect-men' who are infiltrating the planet by night.

The Chief of Police Ola (Gertan Klauber) with the pilot (Peter Jeffrey), two people Dr. Who meets in his new adventure

TECHNICAL OBSERVATIONS

'The Macra Terror' marked the last use of the standard 'Doctor Who' opening title sequence and title music. The opening graphics, designed by Mervyn Pinfield and Bernard Lodge back in 1963, had been used as a 30-second piece of telecine film to introduce 156 episodes of the show. The graphics had been structured so that the name of the programme only became visible in the last third of the sequence. Thus the episode title, writer credit, etc. always had to be superimposed, as caption slides, over each episode's establishing shot or reprise. Ron Grainer's music, arranged by Delia Derbyshire and Brian Hodgson of the Radiophonic Workshop, had also been tailored and timed to match in with this sequence. The cloud patterns shifting and changing, for example, were accompanied by swirls of "white sound" provided by Radiophonics. Thus, with a change in title sequence contemplated, it was apparent to producer Innes Lloyd that the music, too, would have to undergo a re-arrangement.

In writing his storyline and scripts for this show Ian Stuart Black had the Macra in mind as being a race of insect-men. This notion was radically changed by the production crew who felt insect-men might be too comparable with the aliens seen in 'The Web Planet' (Serial "J"). Thus, the creatures were changed to large crabs even though, in the script, they were still referred to as insects. Reportedly, Ian Stuart Black was not very happy with the finished result.

As a production, however, 'The Macra Terror' was a great success, aiding and abetting the ratings recovery staged with 'The Moonbase' (Serial "HH"). It did, though, draw a lot of critical letters, mainly from concerned parents who saw in the programme a level of physical and psychological horror not previously ladelled out in such quantities.

The main bone of contention was the Macra themselves. Although in truth only one full-size Macra was ever built it was a memorable example of good visual effects. The creature stood about nine-feet from ground level to the tips of its antennae. So bulky was it that for scenes requiring visible movement (all of which were done on film) the prop had to be mounted on the back of a lorry cab chassis which was then driven, slowly, in reverse. A powerful set of interior lights gave a white, luminescent glow to the Macra's cranium, which was bright when the creature was active and dull whenever it was dormant. Macra operator Robert Jewell was kept very busy standing inside the wooden framework. A set of levers controlled the movement of the antennae and the attack claws, while the mandible claws were hollow, enabling him to slide his hands inside to work them like gloves. The mouth was rubberised with tubes embedded inside it that fed back, out of camera, to where the effects technicians could hand pump a coloured mixture of foam, wallpaper pasta and wood chippings which emerged as the Macra's slime. By hauling on some interior handles Robert Jewell could also give the monster some limited body movements.

Another aspect of the show which contributed to its horrific appeal was its setting. Aside from early daytime scenes in the first episode almost all the action took place at night using low-key lighting.

The nocturnal setting also aided the studio handling of the Macra's scenes. As mentioned above a lorry cab provided the creature with motion on film, but this could not be used in the studio where noise levels are critical. Instead, a wide variety of tricks was employed to suggest not only one moving Macra, but several of them.

One technique was the careful positioning of a gimballed mirror. This enabled the static Macra to be "seen" from different sets (e.g. beyond the window of a semi-constructed building). Also, by the mirror on its gimbals and by having the camera zooming into the image the creature could be seen shuffling forwards.

Parts of the Macra prop could also be detached, such as the attack claws which could be independently handled by an operator. In such a way the attack on Polly in episode two was achieved. For example, a claw coming through the side of a building and grabbing the girl was followed by a solo close-up of the Macra prop on its stage.

Back-projection of filmed Macra footage also enabled them to be seen on cue in several sets, such as the Colony exterior.

Most complex of all to do was the attack on Jamie by two Macra at the end of episode three/beginning of episode four. Editing of videotape was much easier to do now than it had been in 1963, and so much of this scene was shot out of sequence with Jamie fighting first the Macra left of camera, then the repositioned Macra right of camera. By stringent editing this scene was later blended as a montage, complete with telecine footage, of Jamie huddling in a tunnel vent as the Macra bring down part of the mine roof on top of him.

A major requirement of this story was the use of smoke guns and "Burco" boilers to generate steam, smoke and dry-ice effects for the gas craved by the Macra. The storyline called for the gas to be seen seeping out of the ground at night, and thus a layer of dry-ice covered both the film and studio exterior sets most of the time. This was an aid to the filmed footage of moving Macra, as it hid the fact that the Macra had no obvious walking limbs, only a rubberised skirt. Steam vents were also let into sets which were to be flooded with gas (e.g. the mine tunnels). To disperse the gas controllably these shots were done on film and then rolled in reverse to suggest the air clearing. For the studio sets, in episode four, from which gas had to be dispersed quickly, a wind machine was provided.

Another aspect of the underlying horror of this story was Kenneth Sharp's sets for the Colony interior. His idea was to present it as a holiday camp gone mad - a 'Butlins' in space, masking horror beneath the apparent gaiety. To this end all the sets suggested a holiday camp, even down to the rest cubicles which appeared as a row of chalets complete with inverted V-shaped roofs. The costumes also complemented this idea, appearing on screen as a cross between Redcoat uniforms and the type of Puritanian military uniforms seen on chocolate box lids.

Back-projection was used for all the Control, Propaganda and announcement broadcasts. Both the Colony interior and the Pilot's office sets were fitted with 7' x 5' back-projection screens, onto which either moving telecine or still caption slides could be projected on cue. A photograph of a "handsome" Graham Leaman came up every time a Control broadcast was made. Moving back-projection was employed for the conclusion of episode two as the real Controller is seen and dragged away by the Macra claw.

Richard Beale's Broadcast and Propaganda announcements and Denis Goacher's Americanised Control voice were all pre-recorded a month before the first episode went into the studio. Not only did this help the design and timings of these broadcasts, it also enabled the complex Radiophonic and musical arrangements to be worked out.

Dudley Simpson and the staff of the Radiophonic Workshop (led by Brian Hodgson) worked out the longest and most complex Radiophonic score yet seen in the series. All the Colony scenes had a subliminal set of tones running through them, suggesting everything from a concentrated work environment to "sleep-time". As examples of Radiophonic score totals, during the first episode the score ran to 11 minutes 51 seconds, and in the second it amounted to 18 minutes 26 seconds.

Above this there were all the jingles - the happy rhymes and songs exhorting the workers to ever greater efforts for the good of the Colony. These were composed by Dudley Simpson, arranged by Wilfred Johns and recorded at the Radiophonic Workshop by three unnamed female singers. Simpson and Johns also composed and arranged the main theme and tunes for the Colony celebrations, which needed a three-piece band for the longest track heard at the beginning of episode one and the end of episode four.

Playing solo on an electric organ, Simpson devised the monophonic Macra theme - a reedy-sounding piece which heralded either an appearance of a Macra (episode one) or a Macra attack (episode three).

Working with Brian Hodgson, Dudley Simpson composed the electronic "chimes in" and "chimes out" which preceded and followed every announcement by Control. This also acted as a useful cueing device for the back-projection operators.

Added as a telecine insert to episode four's recording on March 26th. 1967 was a thirty-second trailer for 'The Faceless Ones' (Serial "KK"). This trailer comprised a montage of Gatwick location footage featuring the Doctor, Jamie, Ben and Polly.

PRODUCTION CREDITS

— Compiled by Gary Hopkins —

SERIAL "JJ"	FOUR EPISODES	BLACK AND WHITE
PART 1	-	11th. March 1967
PART 2	-	18th. March 1967
PART 3	-	25th. March 1967
PART 4	-	1st. April 1967

CAST

Doctor Who.....Patrick Troughton
Ben.....Michael Craze
Polly.....Anneke Wills
Jamie.....Frazer Hines

Pilot.....Peter Jeffrey
Barney.....Graham Armitage
Questa.....Ian Fairbairn
Sunnaa.....Jane Enshawe
Chicki.....Sandra Payne (Episode 1)
Karol Keyes (Episode 4)
Drum Majorette.....Maureen Lane
Medok.....Terence Lodge

Ola.....Gertan Klauber
Controller.....Graham Leaman
Alvis.....Anthony Gardner
Control voice.....Denis Goacher
Broadcast voice.....Richard Beale
Macra operator.....Robert Jewell
Official.....John Harvey
Guards.....John Caesar
Steve Emerson, Danny Rae
Leader of Cheerleaders..Roger Jerome
Cheerleader 1.....Ralph Carrigan
Cheerleader 2.....Terry Wright
Pilot's secretary.....Linda Reynolds
Scientist.....Paul Phillips
Girl in Refreshing Department
Nina Huby
Band.....Avril Gaynor, Jill Paris
Fiona Frazer, Maris Hendrick
Janice Hoy, Amanda Scott
Dancers.....Sheelah McGrath
Maureen Hillman, Judy Nichols
Ted Merwood, Anthony Rayner
Joe Finlay
Citizens.....Deryn Fisher
Maureen Morris, Edwina King
Leslie Pitt, Bill Beesley
George Gibbs, Leonard Kingston
Mine workers.....Sheelah McGrath
Maureen Hillman, Judy Nichols
Anthony Rayner, Alan Troy
Walter Henry, Leonard Kingston
Tony Starr

TECHNICAL CREDITS

Production Assistant
Chris D'Oyly-John
Assistant Floor Manager
Ann Faggetter
Assistant.....Marianne Willison
Grams Operator.....Chris Pocock
Vision Mixer.....Bruce Milliard
Floor Assistant.....Charles Wallace
Lighting.....Frank Cresswell
Terry Wild
Sound.....Hugh Barker, Gordon Mackie
Costume Supervisor.....Daphne Dare
Make-up Supervisor.....Gillian James
Music.....Dudley Simpson
Story Editor.....Gerry Davis
Designer.....Kenneth Sharp
Producer.....Innes Lloyd
Director.....John Davies